#### COMMONWEALTH OF KENTUCKY

#### BEFORE THE PUBLIC SERVICE COMMISSION

In the Matter of:

AN EXAMINATION BY THE PUBLIC SERVICE	)	
COMMISSION OF THE APPLICATION OF THE	)	
FUEL ADJUSTMENT CLAUSE OF KENTUCKY	) CASE NO	. 10439
UTILITIES COMPANY FROM NOVEMBER 1,	)	
1986 TO OCTOBER 31, 1988	)	

### INTERIM ORDER

Pursuant to Commission Regulation 807 KAR 5:056, the Commission on December 5, 1988 established this case to review and evaluate the operation of the fuel adjustment clause of Kentucky Utilities Company ("KU") for the 2 years ended October 31, 1988, and to determine the amount of fuel cost that should be transferred (rolled-in) to its base rates to reestablish its fuel adjustment clause charge.

The Attorney General ("AG"), through his Utility and Rate Intervention Division, was the only intervenor in this case. The AG did not present any witnesses, perform any cross-examination, or challenge any evidence or proposals presented by KU.

As part of its review, the Commission ordered KU to submit certain information concerning, <u>inter alia</u>, its fuel procurement, its fuel usage and the operation of its fuel adjustment clause. KU submitted this information on December 22, 1988. A public hearing was held in this case on February 9, 1989, at which Robert Hewitt, Wayne Lucas, and Michael Robinson, KU officials, testified.

KU proposed that the month of August 1988 be used by the Commission as the base period (test month) for the purpose of arriving at the base fuel cost [F(b)] and the KWH sales [S(b)] components of its fuel adjustment clause. It further proposed that its base fuel cost be changed to 14.79 mills per KWH, the actual fuel cost for the proposed base period. KU's current base fuel cost is 18.91 mills per KWH.

In establishing the appropriate level of base fuel cost to be included in KU's rates, the Commission must determine whether the proposed base period fuel cost per KWH is representative of the level of fuel cost currently being experienced by KU. The Commission's review of generation mix, generation unit outages, and generation unit availability discloses that the month of August 1988 is a reasonably representative generation month for KU. Our analysis of KU's monthly fuel clause filings shows that the actual fuel cost incurred for the 2-year period in question ranges from a low of 13.97 mills per KWH in April 1988 to a high of 19.08 mills per KWH in December 1986 with an average cost for the period of 15.55 mills per KWH. Based upon this review, the Commission is of the opinion that KU has complied with Commission Regulation 807 KAR 5:056 and that the proposed base period fuel cost of 14.79 mills per KWH should be approved.

In implementing a new base period fuel cost, the Commission recognizes that the potential for underrecovery of fuel costs exists. KU bills its customers on a daily cycle basis. Customers are billed only after service is received. The average KU customer has a billing period which straddles 2 calendar months.

As a result, his monthly bill is partially for usage in the current calendar month and partially for usage in the prior calendar month. As the change in the base period fuel cost will occur during the billing period, not at its beginning, KU faces the prospect of assessing its customers a fuel adjustment charge based on an incorrect base period fuel cost for a portion of the billing period.

This problem is compounded by the lag in billing customers for the fuel adjustment clause rate. Each customer incurs a fuel adjustment clause charge with every billing period. Because of the time required to calculate the precise charge for that billing period, however, the charge incurred is not actually billed until two billing periods later. 1

The Commission has faced this problem in prior cases, 2 and has found that, while no precise solution exists, a reasonable solution is to average the base period fuel cost prior to and

Consider the following example: The new base period fuel cost is established as 14.79 mills per KWH effective for service rendered on and after July 1, 1989. The actual fuel costs for May and June 1989 are 16.50 and 17.00 mills per KWH respectively. Since half of May sales are billed in May and the other half is billed in June, the base fuel cost of 18.91 mills per KWH would apply to both months. Thus the applicable fuel adjustment charge for May would be <2.41> mills per KWH (16.50 - 18.91) and would be recoverable from customers beginning with the first cycle billed July 1989. The recovery of June fuel costs would not be as easily computed since that half of the sales billed in June would be subject to the old base fuel cost of 18.91 mills per KWH and the other half would be subject to the new base fuel cost of 14.79 mills per KWH.

See, e.q., Case No. 8057, An Examination By the Public Service Commission of the Application of the Fuel Adjustment Clause of Kentucky Utilities Company Pursuant to 807 KAR 5:056E, Sections 1(11) and (12).

after roll-in in computing the fuel adjustment charge for the billing period in which the new base period fuel cost (after roll-in) becomes effective.<sup>3</sup> The use of this procedure in the case at bar, the Commission believes, will eliminate any material impact on KU and its customers from the roll-in of the fuel cost to base rates.

In rendering this decision, the Commission makes no finding on the prudency or reasonableness of KU's fuel procurement practices and will not do so until the separate Commission proceeding on KU's fuel procurement practices has been completed.

The Commission, having considered the evidence of record and being advised, finds that:

- 1. KU has complied in all material respects with the provisions of 807 KAR 5:056.
- 2. The test month of August 1988 should be used as KU's base period for this review.
- 3. KU's proposed base period fuel cost of 14.79 mills per KWH should be approved.

Applying this method to the example presented in note 1, the base fuel cost for June would be the average of the base fuel cost after roll-in of 14.79 mills per KWH and the base fuel cost before roll-in of 18.91, or 16.85. Thus, the fuel adjustment charge for June would be .15 mills per KWH (17.00 - 16.85) and would be recovered from the customers beginning with the first cycle billed in August.

Case No. 9631, An Investigation into the Fuel Procurement Practices of Kentucky Utilities Company.

- 4. The establishment of a base fuel cost of 14.79 mills per KWH requires a transfer (roll-in) of <4.12> mills per KWH from the fuel adjustment clause rate to KU's base rates and can best be accomplished by an energy adder to each KWH sold.
- 5. The rates and charges in Appendix A reflect the transfer (roll-in) to base rates of the differential between the current base fuel cost of 18.91 mills per KWH and the new base fuel cost of 14.79 mills per KWH.
- 6. The rates in Appendix A, attached and incorporated hereto, are fair, just, and reasonable and should be approved for bills rendered on and after July 1, 1989.
- 7. The fuel adjustment clause rate for May 1989, which will be billed in July 1989, should be computed using the base fuel cost prior to roll-in of 18.91 mills per KWH.
- 8. The fuel adjustment clause rate for June 1989, which will be billed in August 1989, should be computed using a base fuel cost of 16.85 mills per KWH, the average of the base fuel cost prior to and after roll-in.
- 9. The fuel adjustment clause rate for July 1989 and succeeding months should be computed using the base fuel cost of 14.79 mills per KWH.
- 10. As no findings are made at this time with respect to the prudency or reasonableness of KU's fuel procurement practices, this matter should be held in abeyance pending the conclusion of Case No. 9631.

### IT IS THEREFORE ORDERED that:

- The charges collected by KU through the fuel adjustment clause for the period November 1, 1986 through October 31, 1988 be and they hereby are approved.
- KU's proposed base period fuel cost of 14.79 mills per KWH be and it hereby is approved.
- The rates in Appendix A are fair, just, and reasonable and are approved for service rendered by KU on and after July 1, 1989.
- The current base rate of 18.91 mills per KWH shall be 4. used to compute the fuel adjustment clause rate for May 1989.
- The average base fuel cost of 16.85 mills per KWH shall be used to compute the fuel adjustment clause rate for June 1989.
- The base fuel cost of 14.79 mills per KWH shall be used to compute the fuel adjustment clause rate for July 1989 and succeeding months.
- This docket shall remain open pending the conclusion of Case No. 9631.
- Within 30 days from the date of this Order, KU shall file with the Commission its revised tariff sheets setting out the rates approved herein.

Done at Frankfort, Kentucky, this 31st day of March, 1989.

PUBLIC SERVICE COMMISSION

Commissioner

ATTEST:

#### APPENDIX A

APPENDIX TO AN ORDER OF THE KENTUCKY PUBLIC SERVICE COMMISSION IN CASE NO. 10439 DATED 3/31/89

The following rates and charges are prescribed for the customers in the area served by Kentucky Utilities Company. All other rates and charges not specifically mentioned herein shall remain the same as those in effect under authority of this Commission prior to the date of this Order.

## RS RESIDENTIAL Rural and Farm Residential Service

#### RATE

Customer Charge Plus an Energy Charge of: \$ 2.75 per month

- 5.139 cents per KWH for the first 100 KWH used per month
- 4.680 cents per KWH for the next 300 KWH used per month
- 4.269 cents per KWH for all in excess of 400 KWH used per month

## Full Electric Residential Service

#### RATE

Customer Charge Plus an Energy Charge of:

- \$ 3.75 per month
- 4.326 cents per KWH for the first 1,000 KWH used per month
- 3.922 cents per KWH for all in excess of 1,000 KWH used per month

### GS General Service

#### RATE

Customer Charge

\$ 4.00 per month

Plus an Energy Charge of:

- 6.603 cents per KWH for the first 500 KWH used per month
- 5.461 cents per KWH for the next 1,500 KWH used per month
- 4.984 cents per KWH for all in excess of 2,000 KWH used per month

## CWH Combination Off Peak Water Heating

RATE

Customer Charge

\$1.00 per month

Plus all energy at 2.740 cents per KWH per month.

## O.P.W.H. Off Peak Water Heating

RATE

Customer Charge

\$1.00 per month

Plus all energy at 3.347 cents per KWH per month.

# RATE 33 Electric Space Heating Rider

RATE

For all KWH used under this schedule during each heating season at 4.001 cents per KWH

## A.E.S. All Electric School

RATE

All KWH at 4.011 cents per KWH

## IS Interruptible Service

RATE

Plus energy charge of 1.697 cents for all KWH used in the billing month

## L.P. Combined Lighting and Power Service

RATE

Plus an Energy Charge of:

- 2.921 cents per KWH for the first 500,000 KWH used per month
- 2.672 cents per KWH for the next 1,500,000 KWH used per month
- 2.542 cents per KWH for all in excess of 2,000,000 KWH used per month

## LCI - TOD LARGE COMMERICAL/INDUSTRIAL TIME-OF-DAY RATE

RATE

Energy Charge of 2.239 cents per KWH for all KWH used.

### HLF HIGH LOAD FACTOR

RATE

Energy Charge of 2.301 cents per KWH for all KWH used.

### MP COAL MINING POWER SERVICE

RATE

Plus an Energy Charge of:

- 2.928 cents per KWH for the first 500,000 KWH used per month
- 2.578 cents per KWH for the next 1,500,000 KWH used per month

## LMP - TOD LARGE MINE POWER TIME-OF-DAY RATE

#### RATE

Energy Charge of 2.119 cents per KWH for all KWH used.

### M WATER PUMPING SERVICE

### RATE

Plus an Energy Charge of:

- 4.729 cents per KWH for the first 10,000 KWH used per month
- 3.996 cents per KWH for all in excess of 10,000 KWH used per month

ST. LT.
STREET LIGHTING SERVICE

#### RATE

Incandescent Sys	stem*	Loa	nd/Light		te Per andard			/Month mental
2,500 Lumens (A 4,000 Lumens (A 6,000 Lumens (A	approximately) approximately) approximately) approximately) approximately)	.201 .327 .447	KW/Light KW/Light KW/Light KW/Light KW/Light	\$ \$	2.15 2.62 3.74 4.98 6.69	\$ \$	2. 3. 4. 5.	38 64 99
Mercury Vapor								
7,000 Lumens (A 10,000 Lumens (A	approximately) approximately) approximately) approximately)	.207	KW/Light KW/Light KW/Light KW/Light	\$	5.50 6.35 7.30 8.56	\$	7. 8. 9.	51 22
High Pressure So	<u>odium</u>							
5,800 Lumens (A 9,500 Lumens (A 22,000 Lumens (A	Approximately) Approximately) Approximately) Approximately) Approximately)	.060 .083 .117 .242 .485	KW/Light KW/Light KW/Light KW/Light KW/Light	\$ \$	4.80 5.20 5.86 8.64 3.92	\$ \$ \$1	7. 8. 1.	71 55 33

\*NOTE: Incandescent restricted to those fixtures in service on October 12, 1982 (except for spot replacement)

## DEC. ST. LT. DECORATIVE STREET LIGHTING SERVICE

RATE

## High Pressure Sodium (HPS) Decorative Street Lighting

Type of Pole and Fixture	Lumen Output	Load/Light in KW	Monthly Rate Per Light
Colonial	4,000	0.060	\$ 6.58
Colonial	5,800	0.083	6.99
Colonial	9,500	0.117	7.58
Contemporary	5,800	0.083	12.09
Contemporary	9,500	0.117	14.40
Contemporary	22,000	0.242	16.69
Contemporary	50,000	0.485	21.59

## P.O.LT. PRIVATE OUTDOOR LIGHTING

#### RATE

Monthly Charge	Approximate Lumens	Type Light	KW Rating
\$ 7.29	7,000	Mercury Vapor	.207
8.58 13.92	20,000* 50,000*	Mercury Vapor High Pressure Sodium	.453 1 .485

NOTE: Not available for urban residential home use

## C.O.LT. CUSTOMER OUTDOOR LIGHTING

### RATE

Lumens	Type Light	KW Rating
2,500	Incandescent	.201
	<del>-</del> -	.126 .207
		2,500 Incandescent 3,500 Mercury Vapor

<sup>\*</sup>Restricted to those fixtures in service on December 15, 1971 \*\*Restricted to those fixtures in service on October 12, 1982

# D/D P.O. LT. DECORATIVE/DIRECTIONAL PRIVATE OUTDOOR LIGHTING

### RATE

## Decorative HPS (Served Underground)

Type of Pole and Fixture	Lumen Output	Load/Light in KW	Monthly Rate Per Light
Colonial	4,000	0.060	\$ 6.58
Colonial	5,800	0.083	6.99
Colonial	9,500	0.117	7.58
Contemporary	5,800	0.083	12.09
Contemporary	9,500	0.117	14.40
Contemporary	22,000	0.242	16.69
Contemporary	50,000	0.485	21.59
	Directional HP	S (Served Overhead)	
Directional	9,500	0.117	5.73
Directional	22,000	0.242	8.12
Directional	50,000	0.485	12.34